Comments on RM-9404:

As the Commission states, interference to licensed users can be minimized by incorporating the "listen-before-transmit" protocol. This is already done by amateurs on the 30 meter band and is covered under Part 97.303 and 97.101. Part 97.303(d) can be modified to include other shared bands such as 2200 meters.

As stated elsewhere, experimenters have not heard any signals in this LF region except for some east coast listeners hearing weak signals from European broadcast stations. It is doubtful there would be any interference issues with primary users.

The proposed 100W PEP power limit is entirely appropriate. I also agree with requiring the licensee to hold at least a General Class license.

I also agree with Com-Ed that the measurement od EIRP is difficult and would propose an "either/or" situation, ie; 100W PEP or 2W EIRP.

The impact from the proposed amateur stations to any unlicensed equipment such as PLC's and RFID devices should not be an issue at all. It is clearly spelled out in Part 15.113 that "A power line carrier system shall operate on an unprotected basis." Further, Part 15.5 says "Interference MUST BE ACCEPTED that may be caused by operation of an authorized station."

If unlicensed (Part 15) users are concerned about interference they should adopt means to improve immunity to their systems.

The following is a quote from a retired power company technician: "PLC receivers are kept at very low sensitivity to eliminate interference problems. PLC transmitters typically range from 1 to 10 watts and at the general loss figure of about 1 dB per mile, high signal levels are maintained between substations. What this means is that outside interference is almost non-existant."

Part 97.307 (a) thru (d) are quite sufficient to prevent interference outside the band of operation.

Regarding the 160-190 kHz band, as the Commission points out, primary users have declined over the years. Perhaps the lack of international interest in this band is because these other countries have no equivalent of our Part 15, so no experimentation has taken place there.

As I said above, PLC systems are unprotected and there have been no reported cases of interference to them. Interference in the 160-190 kHz band would be no greater threat than at 136 kHz. I would point out that for some time the GWEN system operated many high powered transmitters in the 160-190 kHz range and they caused no known interference to any PLC equipment.

Current Part 15 experimenters operating at 1 watt levels can achieve great distances, however these signals are buried in the noise and detecting signals at any distance has only been possible by the use of transmitting Morse CW at the very slow rate of one dit per minute and receiving with computers using sound cards with bandwidths of a few Hz. Even at the

proposed 100 watt level, signals will not be that strong any distance from the transmitter with the typical antenna system most amateurs would be able to erect.

I am therefore highly in favor of a new amateur band in the 2200 meter spectrum and would also urge the consideration of permitting amateur operation in at least a portion (say 10 kHz) of the 1700 meter band with the same parameters as proposed for 2200 meters but allowing phone & image transmissions also.

Respectfully submitted by

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